

United States Patent [19]

Sutherland et al.

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[54] INTRAUTERINE PROBE

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[30] Foreign Application Priority Data

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[57]

ABSTRACT

A method of and apparatus for monitoring the condition of a fetus during labor includes an elongated flexible, flattened body member formed from an electrically insulating material having a rounded distal end and having at least one sensor mounted in a flat face of the body member. The body member is sufficiently directionally stable to be insertable into the vaginal tract and through the cervix and is capable of being guided around the fetus without twisting. The body member has a bending stiffness about an axis transverse to the plane of the body member of between 1 and 10 meganewtons/m². Once the apparatus is introduced into the cervix, the signal output from at least one electrode is analyzed by discriminating the fetal heart rate from the maternal heart rate.

17 Claims, 5 Drawing Sheets